



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

09/775,969

02/02/2001

Ariela Zeira

1-2-152.1US

9648

24374

7590

11/15/2004

VOLPE AND KOENIG, P.C.

DEPT. ICC

UNITED PLAZA, SUITE 1600

30 SOUTH 17TH STREET

PHILADELPHIA, PA 19103

EXAMINER

JAIN, RAJ K

ART UNIT

PAPER NUMBER

2664

DATE MAILED: 11/15/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/775,969

Applicant(s)

ZEIRA ET AL.

Examiner

Raj Jain

Art Unit

2664

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 02 February 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 10 and 18 is/are allowed.
- 6) ☒ Claim(s) 1-9 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 02 February 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 4, 5.
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: _____.

DETAILED ACTION

Claim Objections

Claims 17 and 19 are objected to because of the following informalities: The subject claims are duplicate both dependent upon independent claim 10. Appropriate correction is required.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-9 are rejected under 35 U.S.C. 102(e) as being anticipated by Wales S. (UK Patent GB2351422A).

Regarding claim(s) 1, 4 and 6, Wales discloses system and method for association of midamble codes to channelization codes within a mobile communications system (see abstract, Figs 2-3, page 2 1st para). The communications system comprises of a base station and a plurality of user equipments (see page 1, a general description for base station and mobile terminal communication with respect to various wireless access systems i.e. TDMA, CDMA, etc.), the mobile communication system comprises of:

-providing a mapping of each midamble code to a set of at least one channelization codes (Wales discloses mapping interms of association see abstract, page 3 para 5 and page 2 1st para);

-communication burst to be transmitted in a time slot from the base station, determining the midamble code mapped to that burst's channelization code (see page 4 para 2 and page 6 para 3 and page 2 1st para, Wales discloses the spreading factor which is the communications burst);

-generating and transmitting communication bursts in the time slot, each burst having the determined midamble code for its channelization code (Wales discusses generation and transmission of communications burst for uplink and downlink separately due in-part to complexity of the relationship of midamble codes to its channelization codes, see page 5 last para – page 7 2nd para);

-receiving the communication bursts at the user equipment (see page 7 2nd para, downlink transmission);

-determining each received midamble code and determining at the user equipment the channelization codes of the transmitted communication bursts based on in part a result of the determining of each received midamble code and the mapping (see page 2 paras 3- page 3, the midamble codes are associated (or mapped) to the channelization codes by a pre-determined selection process and further applying a set of rules to the midamble codes such that the channelization codes are known); and

-detecting data from the received bursts using multiuser detection based on in part the determined channelization codes (see pages 6-7, downlink detection of data are based on the status of “active” vs. “non-active” channelization codes, further if different midamble codes are assigned to each channelization codes, the mobile can detect which are the active codes by correlation with known midamble codes).

Art Unit: 2664

Regarding claims 2 and 5, Wales discloses channelization codes as being orthogonal codes taken from a set of Walsh codes which may be one or more channelization codes as necessary and/or required (see page 2 parar 2).

Regarding claim 3, Wales discloses detecting data from the received bursts using multiuser detection based on in part the determined channelization codes (see pages 6-7, downlink detection of data are based on the status of "active" vs. "non-active" channelization codes, further if different midamble codes are assigned to each channelization codes, the mobile can detect which are the active codes by correlation with known midamble codes).

Regarding claim 7, Wales discloses the shift of midamble codes by allocation of maximum number of midamble codes per time slot (see Fig 2 and page 6 1st para).

Regarding claim 8 and 9, Wales discloses channelization codes may be one or more in conjunction with one or more midamble codes to be used for transmission (see page 6 1st para).

Allowable Subject Matter

Claims 10 and 18 allowed.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Raj Jain whose telephone number is 571-272-3145. The examiner can normally be reached on M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Wellington Chin can be reached on 571-272-3134. The fax phone numbers for the

Application/Control Number: 09/775,969

Page 5

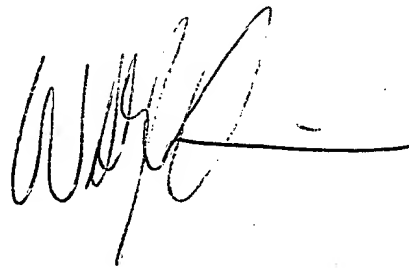
Art Unit: 2664

organization where this application or proceeding is assigned are (703) 872-9306 for regular communications and (703) 872-9306 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-4700.

RJ

November 2, 2004

A handwritten signature in black ink, appearing to be 'W. H. K.', followed by a horizontal line.